Long Term Care Insurance: Factors Impacting Premiums and The Rationale for Rate Adjustments

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- The data contained in this presentation are for illustrative purposes only. Actual results for any specific situation would differ.
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Presentation Outline

- Purpose of Presentation
- LTCI Industry Profile
- LTCI Economics Sample Block
 - Key LTCI risks
 - Pricing expectations premiums, claims, number of lives
 - Actual results, using current assumptions at 10 years
 - Rate increase needed and effect on cumulative future loss ratios at 10 years
 - Cost of waiting rate increase needed after 5, 10, 15, 20 or 25 years
 - Key sensitivities
- Future State of LTCI Rate Regulation



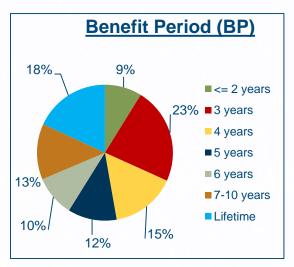
Purpose of Presentation

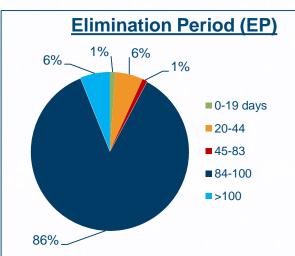
- To show the potential financial ramifications that LTC insurers may face when original pricing assumptions are not met.
- To demonstrate the effect that immediate versus delayed rate increases may have on a LTCI block of business.
- To emphasize the need for immediate, cohesive regulatory action, such that the rate increase landscape can become more predictable and efficient.

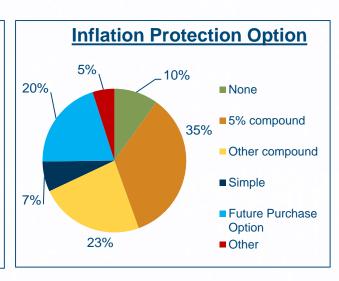


LTCI Industry Profile – New Sales

(2013 Broker World Survey)







LTCI policy design features that increase probability of rate adjustments – lifetime BP, 0-day EP, 5% compound inflation – are either no longer being offered or are emphasized less. Other antiselective risk elements being offered less: full cash benefits, limited pay options.



Long Term Care Insurance is a Complex Product...

Pricing is on a lifetime basis (level premium, increasing age curve), and major factors affect the rates:

- Morbidity made up of frequency (probability of starting a claim), continuance curves (probability of person staying on claim – determines length of claim), and utilization (average cost per service and number/mix of services)
- Lapse and mortality determines how many people get to durations when claims are expected to be high
- Interest rate environment
 — determines how much money is made on large reserves that are accumulating

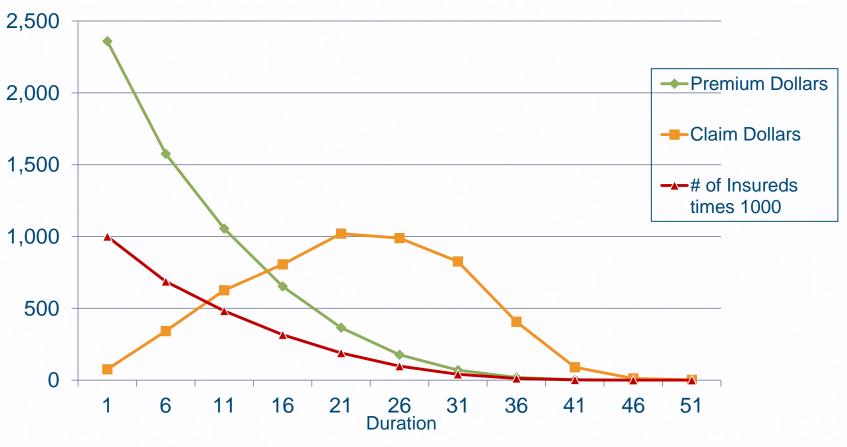


Effect of Changes in the Three Major Risks

- LTCI carriers have been subjected to a "perfect storm" in recent years:
 - Morbidity could be higher or lower than expected. Lengths of stay have been increasing.
 - Lapse rates and mortality have been lower than expected, and have dropped since early generations were priced.
 - Interest rates have declined substantially.
- Net impact...more policies last to later durations, where claims are high, and companies are earning less investment income than they had expected on reserves.



LTC Insurance – Per Policy Sample Financial Results by Duration Original Pricing – 10 Years Ago (All Ages)



- Lifetime loss ratio at 4.0% =

62.3%

- Statutory IRR =

15.1%



Example of Assumption Change for Sample CompanyOriginal Pricing - 10 Years Ago

Three significant changes:

- Morbidity
 - 10% higher than originally assumed
- Voluntary lapse rate
 - Original assumed ultimate lapse rate = 4.75%
 - Actual ultimate lapse rate = 1.0%
- Interest rate environment
 - Original assumed rate = 6.9%
 - Actual current rate = 4.5%



Effect of Voluntary Lapse Rates on Number of Insureds Inforce (assuming no change in mortality)

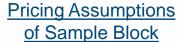
Beginning of Policy Year	Original Pricing*	Revised**
1	1000	1000
6	688	755
11	482	638
16	316	507
21	189	366

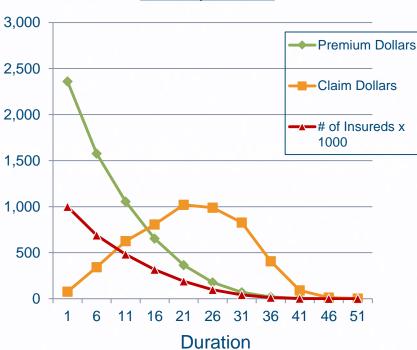
^{*} Original assumed voluntary lapse rate assumptions = 8%, 6.75%, 5.75%, 4.75%

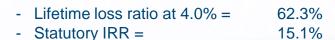


^{**} Actual voluntary lapse rates = 8%, 5%, 3.5%, 2.5%, 2%, 1.5%, 1.0%

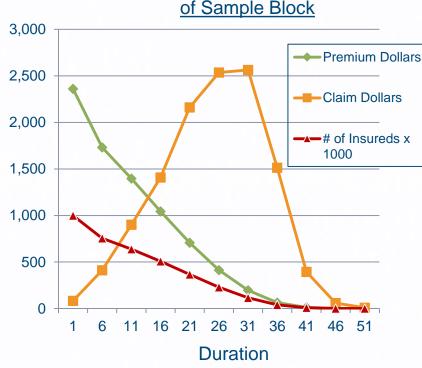
LTCI Policy Premiums and Claims – Effect of the Three Changes on Sample Block











- Lifetime loss ratio at 4.0% = 104.6%

Statutory IRR = -0.9%



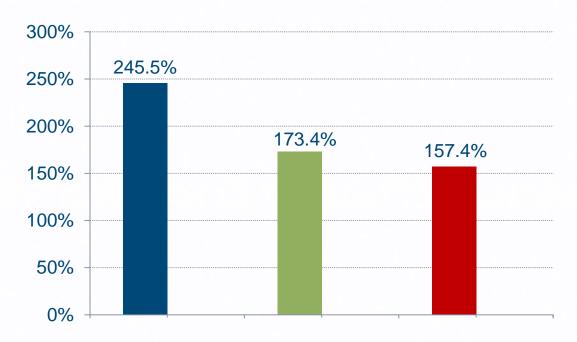
Effect of Revised Assumptions on Sample LTCI Block's Lifetime Financial Results

Age Band	Original Pre-tax Margin as % of Premium @ 6.9%*	Revised Pre-tax Margin as % of Premium @ 4.5%*	Original Statutory IRR	Revised Statutory IRR
55-59	31.8%	-32.3%	15.2%	-0.5%
65-69	21.2%	-20.5%	15.0%	-2.3%
75-79	13.2%	-7.0%	14.4%	-1.6%
All	25.1%	-24.8%	15.1%	-0.9%

^{*}Discount rate is equal to the investment earnings rate. For both scenarios, reserves are developed using 4.0% discount rate. Pre-tax margins are BEFORE taxes and risk based capital.



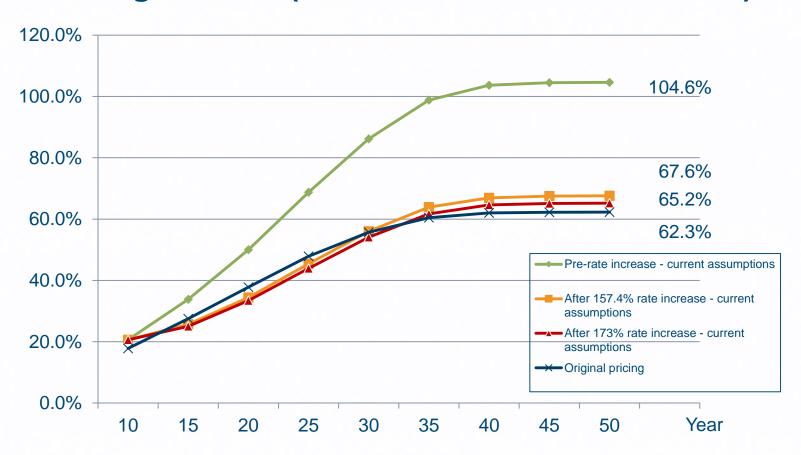
Rate Increase for Sample LTC Block Needed after 10 Years – Varies Based on Criteria Used



- Produces lifetime 60% lifetime loss ratio and 11.9% IRR.
- Produces 58% lifetime loss ratio and 85% loss ratio on rate increase portion of the premium (without adding any moderately adverse margin) and 8.8% IRR.
- Produces 62.3% lifetime loss ratio and 85% loss ratio on rate increase portion of the premium (without adding any moderately adverse margin) and 8.0% IRR.



Projected Loss Ratio for Sample Block, Cumulative through Year X (Accumulated at 4.0% Interest)

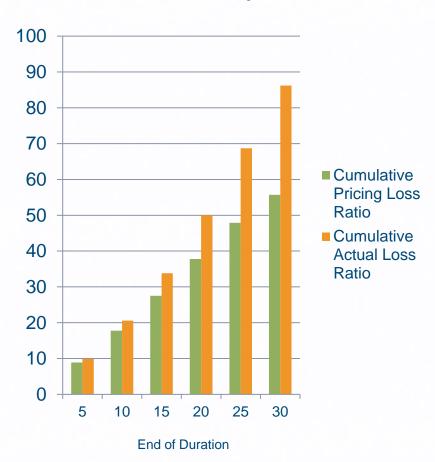


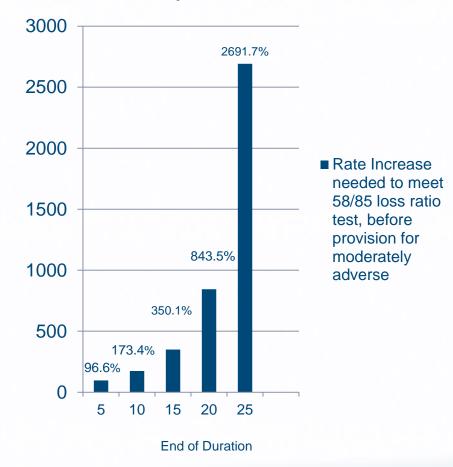
- Projected lifetime loss ratio improves from 104.6% to 65.2% with 173.4% rate increase, or to 67.6% with 157.4% rate increase.
- This is still 3 to 5 percentage points higher than the original projected lifetime loss ratio of 62.3%.



LTCI Rate Increase: Cost of Waiting

(58/85 rule used for rate increases)

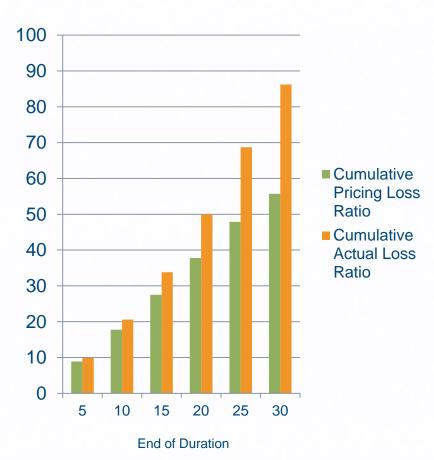


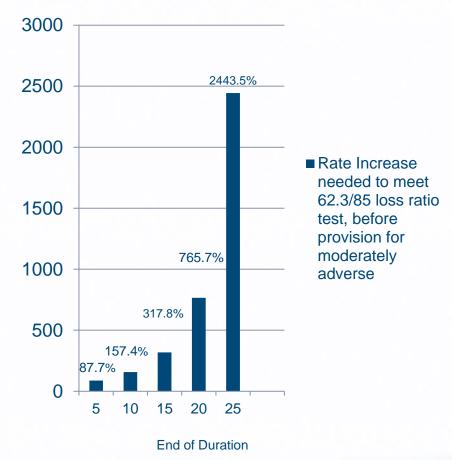




LTCI Rate Increase: Cost of Waiting

(original loss ratio/85 rule used for rate increases)







Sensitivity of Rates to Assumption Changes

- Effect of an assumption change varies by issue age, by whether or not compound inflation is included, and by profit target used
- Rough rules of thumb of the effect of an assumption change at time of issue (using average age distribution):
 - One percent reduction in lapse rates results in:
 - 9% increase in non-inflationary rates
 - 13% increase in inflationary rates
 - One point drop in investment income rate results in:
 - 7% increase in non-inflationary rates
 - 11% increase in inflationary rates
 - 10% increase in morbidity results in:
 - 10% increase in rates (non-inflationary and inflationary)



Future of LTC Insurance Rate Regulation

- Balanced solution for all parties is necessary, to protect insureds, ensure appropriate regulatory environment for sufficient LTCI offerings, and protect Medicaid
- Need a coordinated solution by regulators, which includes the approval of actuarially-justified rate increases
- Closed blocks' ability to restore to adequacy without reliance on future business is minimal
- Continue to allow policyholder options to mitigate rate increases (whether those options are actuarially equivalent or not)
- Improved policyholder communications



Future of LTC Insurance Rate Regulation

- Annual rate certifications to demonstrate actual vs. expected experience emergence
- Future expectations for rate increases should be filed, with criteria to address both favorable and unfavorable development
- Modification of requirement to re-certify to moderately adverse at rate increase time...allowing lower increases and/or increases spread out over multiple years; allowing "landing spots" or reduced benefits to mitigate effect of rate increases. These options are already being done by most carriers.
- There is a need for immediate, cohesive regulatory action, such that the rate increase landscape can become more predictable and efficient



